EM 385-1-1 3 Sep 96

APPENDIX D

ASSURED EQUIPMENT GROUNDING CONDUCTOR PROGRAM

An assured equipment grounding conductor program consists of a written procedure for documented inspection and testing to assure equipment grounding conductors for all cord sets, receptacles which are not a part of the permanent wiring of the building or structure, and equipment connected by cord and plug are installed and maintained to protect employees on construction sites. An assured equipment grounding conductor program shall be continuously implemented at the construction site.

Equipment found damaged or defective or which fails any of the prescribed inspections or tests may not be used until repaired or replaced.

The following shall be visually inspected before each day's use for external defects (such as deformed or missing pins or insulation damage) and for indication of possible internal damage:

- (1) cord sets,
- (2) attachment caps,
- (3) plug and receptacle of cord sets, and
- (4) any equipment connected by cord and plug (except cord sets and receptacles which are fixed and not exposed to damage).

Equipment grounding conductors on the following shall be tested for continuity and shall be electrically continuous:

- (1) all cord sets
- (2) receptacles which are not a part of the permanent wiring of the building or structure, and
- (3) all plug-connected equipment required to be grounded.

EM 385-1-1 3 Sep 96

Each receptacle and plug of the following shall be tested for correct attachment of the equipment grounding conductor and the equipment grounding conductor shall be connected to its proper terminal:

- (1) all cord sets,
- (2) receptacles which are not a part of the permanent wiring of the building or structure, and
- (3) all plug-connected equipment required to be grounded.

All required tests shall be performed with the following frequency:

- (1) before the first use,
- (2) before equipment is returned to service following any repairs,
- (3) before equipment is used after any incident which can be reasonably suspected to have caused damage (e.g., when a cord set is run over), and
- (4) at intervals not to exceed three months, except that cord sets and receptacles which are fixed and not exposed to damage shall be tested at intervals not to exceed six months.

All inspections and tests shall be documented to identify each receptacle, cord set, and cord- and plug-connected equipment that passed the inspection or test, the date of inspection or test, and the individual responsible for the inspection or test.

APPENDIX E

WOODWORKING MACHINERY GUARDING

1910.213 Woodworking machinery requirements.

- (a) Machine construction general. (1) Each machine shall be so constructed as to be free from sensible vibration when the largest size tool is mounted and run idle at full speed.
- (2) Arbors and mandrels shall be constructed so as to have firm and secure bearing and be free from play.
- (3) [Reserved]
- (4) Any automatic cutoff saw that strokes continuously without the operator being able to control each stroke shall not be used.
- (5) Saw frames or tables shall be constructed with lugs cast on the frame or with an equivalent means to limit the size of the saw blade that can be mounted, so as to avoid overspeed caused by mounting a saw larger than intended.
- (6) Circular saw fences shall be so constructed that they can be firmly secured to the table or table assembly without changing their alignment with the saw. For saws with tilting tables or tilting arbors the fence shall be so constructed that it will remain in a line parallel with the saw, regardless of the angle of the saw with the table.
- (7) Circular saw gages shall be so constructed as to slide in grooves or tracks that are accurately machined, to insure exact alignment with the saw for all positions of the guide.
- (8) Hinged saw tables shall be so constructed that the table can be firmly secured in any position and in true alignment with the saw.
- (9) All belts, pulleys, gears, shafts, and moving parts shall be guarded in accordance with the specific requirements of 1910.219.
- (10) It is recommended that each power-driven woodworking machine be provided with a disconnect switch that can be locked in the off position.
- (11) The frames and all exposed, noncurrent-carrying metal parts of portable electric woodworking machinery operated at more than 90 volts to ground shall be grounded and other portable motors driving electric tools which are held in the hand while being operated shall be grounded if they operate at more than 90 volts to ground. The ground shall be provided through use of a separate ground wire and polarized plug and receptacle.
- (12) For all circular saws where conditions are such that there is a possibility of contact with the portion of the saw either beneath or behind the table, that portion of the saw shall be covered with an exhaust hood, or, if no exhaust system is required, with a guard that shall be so arranged as to prevent accidental contact with the saw.
- (13) Revolving double arbor saws shall be fully guarded in accordance with all the requirements for circular crosscut saws or with all the requirements for circular ripsaws, according to the kind of saws mounted on the arbors.
- (14) No saw, cutter head, or tool collar shall be placed or mounted on a machine arbor unless the tool has been accurately machined to size and shape to fit the arbor.